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ance Notes on Codes and Abbreviations" appearing at the begin-
ning of each regular issue of the PCT Gazette.*

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(54) Title: ANTISTATIC COMPOSITION

(57) Abstract: An antistatic composition comprises (a) at least one ionic salt consisting of a nonpolymeric nitrogen onium cation and a weakly coordinating fluoroorganic anion, the conjugate acid of the anion being a superacid; and (b) at least one thermoplastic polymer. The composition exhibits good antistatic performance over a wide range of humidity levels.

A. CLASSIFICATION OF SUBJECT MATTER

IPC 7 C08K5/00 C09K3/16 //(C08K5/00,5:19,5:42,5:435)

According to International Patent Classification (IPC) or to both national classification and IPC

B. FIELDS SEARCHED

Minimum documentation searched (classification system followed by classification symbols)

IPC 7 C08K C09K

Documentation searched other than minimum documentation to the extent that such documents are included in the fields searched

Electronic data base consulted during the international search (name of data base and, where practical, search terms used)

WPI Data, EPO-Internal, CHEM ABS Data

C. DOCUMENTS CONSIDERED TO BE RELEVANT

Category *	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
A	WO 84 02798 A (MINNESOTA MINING & MFG) 19 July 1984 (1984-07-19) page 5, line 24 -page 6, line 36; claims 1,18-20 page 8, line 15 - line 26 ---	1,2
A	EP 0 363 094 A (MINNESOTA MINING & MFG) 11 April 1990 (1990-04-11) page 4, line 16 - line 17 examples ---	1,3,15
X	---	15
A	WO 90 05129 A (PPG INDUSTRIES INC) 17 May 1990 (1990-05-17) examples ---	1,2
A	EP 0 873 986 A (ALTECH COMPANY LIMITED) 28 October 1998 (1998-10-28) claims -----	1,2

☐ Further documents are listed in the continuation of box C.☒ Patent family members are listed in annex.

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INTERNATIONAL SEARCH REPORT

Information on patent family members

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Patent document cited in search report		Publication date	Patent family member(s)	Publication date
WO 8402798	A	19-07-1984	US 4570197 A AU 564317 B AU 2418584 A BR 8307674 A DE 3382707 D DE 3382707 T EP 0131587 A JP 4039755 B JP 60500468 T	11-02-1986 06-08-1987 02-08-1984 11-12-1984 09-09-1993 03-03-1994 23-01-1985 30-06-1992 04-04-1985
EP 0363094	A	11-04-1990	US 4873020 A DE 68908066 D DE 68908066 T JP 2139026 A	10-10-1989 09-09-1993 03-02-1994 29-05-1990
WO 9005129	A	17-05-1990	US 4904825 A CA 2001561 A EP 0442948 A JP 4502911 T US 5053531 A US 5187214 A	27-02-1990 08-05-1990 28-08-1991 28-05-1992 01-10-1991 16-02-1993
EP 0873986	A	28-10-1998	JP 10298539 A CA 2235502 A CN 1197100 A US 6028132 A	10-11-1998 22-10-1998 28-10-1998 22-02-2000